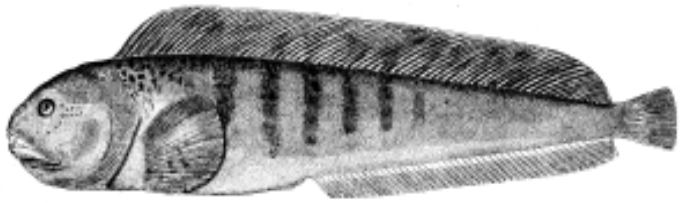

Last Revised: January 2000

Summary Status

Landings and Abundance Trends

Landings Data

PDF Version

Atlantic Wolffish

by
Ralph Mayo

The Atlantic wolffish or catfish, *Anarhichas lupus*, is a cold-water species of relatively minor importance in Gulf of Maine fisheries. Distribution data indicate that populations on Georges Bank and in the western Gulf of Maine are discrete from wolffish in the Browns Bank-Scotian Shelf area. West of the Scotian Shelf, abundance appears to be highest in the southwestern portion of the Gulf of Maine from Jeffreys Ledge to the Great South Channel, at depths of 80 to 120 m (45 to 65 fathoms). Wolffish are sedentary and rather solitary in habit, and populations tend to be localized. Little is known about the biology of this species. Individuals may attain lengths of 150 cm (59 in.) and weights of 18 kg (40 lb). They prey heavily on shellfish.

Wolffish have been taken primarily as bycatch in the otter trawl fishery, although the species has been an intended component in some mixed trawl fisheries. Recreational catches are insignificant. The species is not presently managed.

Since 1970, the U.S. nominal commercial catch has been about evenly divided between Georges Bank and the Gulf of Maine. In the last two decades, U.S. vessels have taken more than 85% of the total Georges Bank-Gulf of Maine catch; the remainder was taken by Canadian fishermen. Total Georges Bank-Gulf of Maine landings increased from 200 mt in 1970 to approximately 1,200 mt in 1984, and have since declined sharply to less than 500 mt annually since 1992. Landings were approximately 300 mt in 1998, the lowest since the early 1970s. Canadian landings have been insignificant in recent years.

The NEFSC spring bottom trawl survey biomass index generally fluctuated between 1.0 kg/tow and 2.0 kg/tow between 1968 and 1988 (Avg = 1.48 kg/tow), but has shown a consistent downward trend since the late 1980s. The 1997-1999 biomass indices were all less than 0.2 kg/tow (Avg = 0.12 kg/tow), the lowest in the survey time series, at about 8% of the 1968-1988 average.

The decline in landings and in NEFSC trawl survey indices since the late 1980s indicate that biomass has been substantially reduced. This stock remains overexploited and in a severely depleted state.

For further information

Bigelow, H. B., and W. C. Schroeder. 1953. Fishes of the Gulf of Maine. Fish. Bull., U.S. Fish. Wildl. Serv. 74(53).

Nelson, G. A., and M. R. Ross. 1992. Distribution, growth and food habits of the Atlantic wolffish *Anarhichas lupus*) from the Gulf of Maine-Georges Bank region. J. Northw. Atl. Fish. Sci. 13:53-61.

Summary Status

Long-term potential catch (MSY)	=	<1,000 mt
Biomass corresponding to MSY	=	Unknown
Minimum biomass threshold	=	N/A
Stock biomass in 1998	=	Unknown
F_{MSY}	=	N/A
F_{TARGET}	=	N/A
Overfishing Definition	=	N/A
F_{1998}	=	N/A
Age at 50% maturity	=	Unknown
Size at 50% maturity	=	Unknown
Assessment level	=	Index
Management	=	None

M = Unknown **$F_{0.1}$ = Unknown** **F_{max} = Unknown**

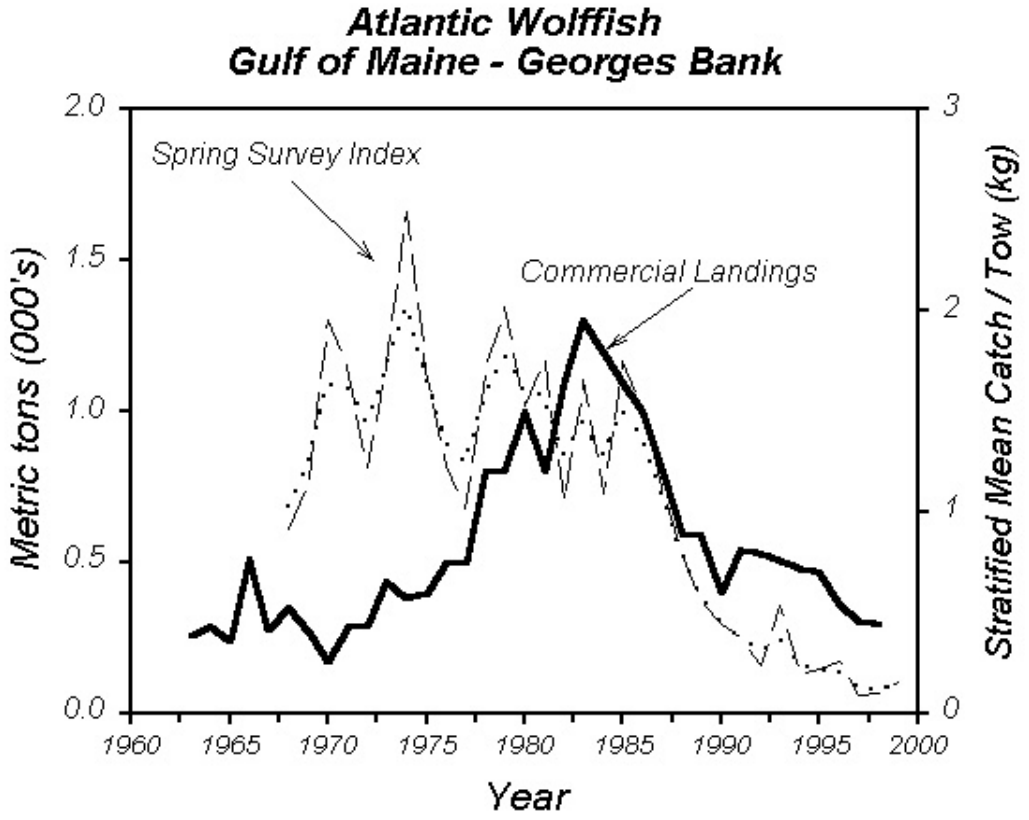

Table 19.1 Recreational catches and commercial landings (thousand metric tons)

		Year									
Category	**1979-88 average**	**1989**	**1990**	**1991**	**1992**	**1993**	**1994**	**1995**	**1996**	**1997**	**1998**
U.S. recreational	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1
Commercial											
United States	0.8	0.5	0.4	0.5	0.5	0.5	0.5	0.5	0.4	0.3	0.3
Canada	0.1	0.1	0.1	0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1
Other	-	-	-	-	-	-	-	-	-	-	-
Total nominal catch	0.9	0.6	0.5	0.6	0.5	0.5	0.5	0.5	0.4	0.3	0.3